

TEKTELIC FLUX

LoRaWAN® Smart AC Outlet

TEKTELIC FLUX is an ideal solution for Smart Home and Office automation. The FLUX gives users the ability to automatically trigger a 120VAC, 60Hz switch over a LoRaWAN® network, allowing for cost savings from improved power consumption practices and enhanced home and office safety and security. Its compact, robust design makes it easy to integrate into existing infrastructure, enabling reliable remote control of lights, appliances, and other electrical loads in both residential and commercial environments.



Sensing Measurements



CONSUMED ENERGY



LINE VOLTAGE



LOAD CURRENT



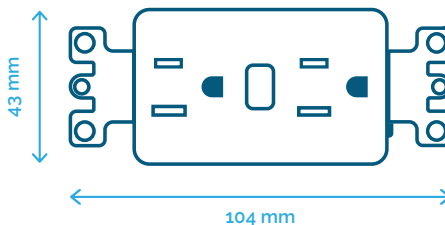
LOAD POWER
(REAL, REACTIVE,
AND APPARENT)



LOAD POWER FACTOR

Features

- ✓ **Energy consumption monitoring** provides visibility into voltage, current, power, and overall usage to improve efficiency and reduce costs
- ✓ **Remote on / off control** lets users manage their connected devices from anywhere
- ✓ **Dual-outlet design** includes an always-on receptacle paired with a second receptacle that can be remotely controlled over LoRaWAN
- ✓ Remote operation enables **cloud-based configuration, monitoring, and management**
- ✓ **Tamper-resistant design** detects unauthorized access or removal to ensure secure and reliable deployment
- ✓ **LED status indicator** provides visual feedback for device status, power, and network connectivity
- ✓ Compatible with standard LoRaWAN® gateways and network servers for **broad interoperability**
- ✓ **Quick and easy device onboarding & data viewing** using TEKTELIC LeapX™ mobile application
- ✓ TEKTELIC Kona Atlas™ support for payload encoding and decoding
- ✓ **Compact industrial form factor** designed for discrete deployment
- ✓ **Rapid deployment** for scalable commercial and enterprise installations



Technical and Functional System Specifications

General System Parameters		
Operational Temperature	0°C to 40°C	
Operational Relative Humidity	5% - 95% Non-Condensing	
Size	43 W x 47 D x 104 H mm	
Weight	120 g	
Voltage	120 VAC, 60 Hz	
Load	Incandescent	1000 W
	Electronic Ballast	5 A
	Standard Ballast	1200 VA
	Resistive	1800 W (15 A)
	Motor	1/2 HP
Frequency	908.42 MHz	
Range	Up to 40 m line of site	
Wire Termination	Max 2 wires per terminal except 1 wire for ground #14 - #12 AWG copper or copper clad solid conductor 16 mm (5/8") strip length Torque terminal screw to 2.3 Nm (20 lbf-in)	
Wireless Parameters (LoRa)		
RF Power (Max)	20 dBm (100 mW)	
RF Sensitivity	Up to -140 dBm	
Channel Plans	US915	
Antenna	Internal	
LoRa Device Class	Class C	
Specification Version	1.0.2	
Certifications & Compliance		
Regulatory	FCC	
Product Safety	UL CUL	
Environmental	RoHS	

TEKTELIC Communications is a premier supplier of complete LoRaWAN® IoT solutions. Our end-to-end systems combine network infrastructure, devices, and applications to enable easy, fast, and cost-effective deployment for the most demanding IoT challenges.